



S/09/988384

PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Applicant:	David H. Sherman et al.	Examiner:	Kathleen M. Kerr
Serial No.:	09/988384	Group Art Unit:	1652
Filed:	November 19, 2001	Docket:	600.536US1
Title:	PROMOTER FOR METHYMYCIN AND PIKROMYCIN		

INFORMATION DISCLOSURE STATEMENT

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

In compliance with the duty imposed by 37 C.F.R. § 1.56, and in accordance with 37 C.F.R. §§ 1.97 *et. seq.*, the enclosed materials are brought to the attention of the Examiner for consideration in connection with the above-identified patent application. Applicants respectfully request that this Information Disclosure Statement be entered and the documents listed on the attached Form 1449 be considered by the Examiner and made of record. Pursuant to the provisions of MPEP 609, Applicants request that a copy of the 1449 form, initialed as being considered by the Examiner, be returned to the Applicants with the next official communication.

Pursuant to 37 C.F.R. §1.97(c)(2), please charge Deposit Account No. 19-0743 in the amount of \$180.00 to cover the requisite fee as set forth in 37 C.F.R. §1.17(p). Please charge any additional fees or credit any overpayment to Deposit Account No. 19-0743.

09/27/2004 NR0CHA1 00000003 190743 09988384

02 FC:1806 180.00 DA

INFORMATION DISCLOSURE STATEMENT

Serial No :09/988384

Filing Date: November 19, 2001

Title: PROMOTER FOR METHYMYCIN AND PIKROMYCIN

Page 2

Dkt: 600.536US1

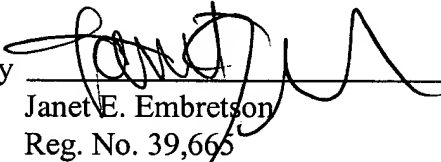
The Examiner is invited to contact the Applicants' Representative at the below-listed telephone number if there are any questions regarding this communication.

Respectfully submitted,

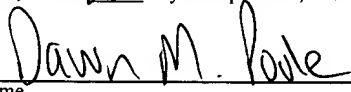
DAVID H. SHERMAN ET AL.

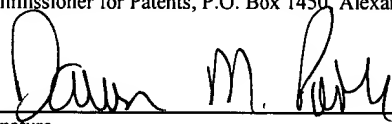
By their Representatives,

SCHWEGMAN, LUNDBERG, WOESSNER & KLUTH, P.A.
P.O. Box 2938
Minneapolis, MN 55402
(612) 373-6959

Date September 22, 2004 By 
Janet E. Embretson
Reg. No. 39,665

CERTIFICATE UNDER 37 CFR 1.8: The undersigned hereby certifies that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail, in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on this 22 day of September, 2004.


Name

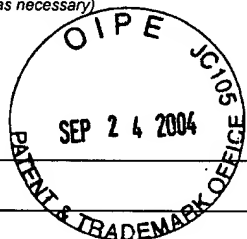

Signature

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Complete if Known

Application Number	09/988,384
Filing Date	November 19, 2001
First Named Inventor	Sherman, David
Group Art Unit	1652
Examiner Name	Kerr, Kathleen

Sheet 1 of 8

Attorney Docket No: 600.536US1

US PATENT DOCUMENTS

Examiner Initial *	USP Document Number	Publication Date	Name of Patentee or Applicant of cited Document	Class	Subclass	Filing Date If Appropriate
	US-4,874,748	10/17/1989	Katz, L. , et al.	514	29	03/24/1986
	US-4,885,251	12/05/1989	Ingolia, T. D. , et al.	435	183	08/08/1986
	US-4,886,757	12/12/1989	Richardson, M. A.	435	252.3	04/15/1987
	US-4,892,819	01/09/1990	Carr, L. G. , et al.	435	69.1	11/25/1985
	US-4,935,340	06/19/1990	Baltz, R. H. , et al.	435	6	06/07/1985
	US-4,952,502	08/28/1990	Epp, J. K. , et al.	435	76	02/24/1987
	US-5,057,425	10/15/1991	Stanzak, R. K.	435	252.3	07/29/1988
	US-5,063,155	11/05/1991	Cox, K. L. , et al.	435	76	03/28/1988
	US-5,068,189	11/26/1991	Epp, J. K. , et al.	435	183	05/13/1988
	US-5,098,837	03/24/1992	Beckmann, R. J. , et al.	435	172.3	06/07/1988
	US-5,108,918	04/28/1992	Groenen, M. A. , et al.	435	172.3	02/01/1989
	US-5,116,968	05/26/1992	Lawrence, G. C. , et al.	536	71	12/20/1990
	US-5,141,926	08/25/1992	Weber, J. M. , et al.	514	29	04/18/1990
	US-5,149,638	09/22/1992	Beckmann, R. J. , et al.	435	76	07/30/1991
	US-5,149,639	09/22/1992	Katz, L. , et al.	435	76	05/25/1989
	US-5,168,052	12/01/1992	Cox, K. L. , et al.	435	72	03/20/1990
	US-5,191,016	03/02/1993	Yalpani, M.	525	54.2	07/19/1990
	US-5,229,279	07/20/1993	Peoples, Oliver P. , et al.	435	135	08/13/1990
	US-5,245,023	09/14/1993	Peoples, Oliver P. , et al.	536	23.2	05/08/1991
	US-5,250,430	10/05/1993	Peoples, O. P. , et al.	435	232	09/14/1992
	US-5,462,862	10/31/1995	Groenen, M. A. , et al.	435	69.1	01/25/1993
	US-5,480,794	01/02/1996	Peoples, O. P. , et al.	435	232	08/12/1994
	US-5,512,669	04/30/1996	Peoples, O. P. , et al.	536	23.2	08/29/1994
	US-5,514,544	05/07/1996	Rao, R. N. , et al.	435	6	07/26/1991
	US-5,534,432	07/09/1996	Peoples, O. P. , et al.	435	240.4	04/07/1995
	US-5,545,553	08/13/1996	Gotschlich, E. C.	435	252.33	09/26/1994
	US-5,589,385	12/31/1996	Ryan, M. J. , et al.	435	258.35	09/22/1993
	US-5,610,041	03/11/1997	Somerville, C. R. , et al.	435	135	06/06/1994
	US-5,661,026	08/26/1997	Peoples, O. P. , et al.	435	252.3	05/04/1995
	US-5,663,063	09/02/1997	Peoples, O. P. , et al.	435	135	05/10/1995
	US-5,665,564	09/09/1997	Caruso, M. , et al.	435	69.1	08/09/1993
	US-5,672,491	09/30/1997	Khosla, C. , et al.	435	148	05/06/1994
	US-5,672,497	09/30/1997	Cox, K. L. , et al.	435	320.1	12/21/1995
	US-5,702,717	12/30/1997	Cha, Y. , et al.	424	425	10/25/1995

EXAMINER

DATE CONSIDERED

Substitute Disclosure Statement Form (PTO-1449)

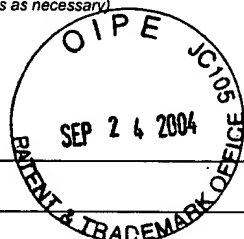
* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. 1 Applicant's unique citation designation number (optional) 2 Applicant is to place a check mark here if English language Translation is attached

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)



Sheet 2 of 8

Complete if Known

Application Number	09/988,384
Filing Date	November 19, 2001
First Named Inventor	Sherman, David
Group Art Unit	1652
Examiner Name	Kerr, Kathleen

Attorney Docket No: 600.536US1

US-5,712,146	01/27/1998	Khosla, C. , et al.	435	252.35	06/07/1995
US-5,716,849	02/10/1998	Ligon, J. M., et al.	435	419	12/14/1996
US-5,744,350	04/28/1998	Vinci, V. A., et al.	435	254.11	05/25/1995
US-5,798,235	08/25/1998	Peoples, O. P., et al.	435	135	06/07/1995
US-5,824,513	10/20/1998	Katz, L. , et al.	435	76	01/17/1991
US-5,830,750	11/03/1998	Khosla, C. , et al.	435	252.35	03/31/1997
US-5,843,718	12/01/1998	Khosla, C. , et al.	435	69.1	03/31/1997
US-5,866,410	02/02/1999	Ryan, M. J., et al.	435	320.1	06/07/1995
US-5,962,290	10/05/1999	Khosla, C. , et al.	435	183	10/14/1997
US-6,022,731	02/08/2000	Khosla, C. , et al.	435	252.35	03/31/1997
US-6,033,883	03/07/2000	Barr, P. J., et al.	435	148	12/11/1997
US-6,077,696	06/20/2000	Khosla, C. , et al.	435	135	03/05/1999
US-6,090,601	07/18/2000	Gustafsson, C. , et al.	435	183	01/23/1998
US-6,117,659	09/12/2000	Ashley, G. , et al.	435	155	05/27/1999
US-6,303,767	10/16/2001	Betlach, Melanie C., et al.			11/05/1999

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Foreign Document No	Publication Date	Name of Patentee or Applicant of cited Document	Class	Subclass	T ²
	CA-2107505 ✓	04/09/1994	Baltz, Richard H.	C12 N	015/11	
	EP-0 062 080 ✓	10/13/1982	Spaar, H. D.	B01D	33/04	
	EP-0 238 323 ✓	09/23/1987	Cox, K. L., et al.	C12 N	15/00	
	EP-0 361 905 ✓	04/04/1990	Epp, J. K., et al.	C12 N	15/52	
	EP-0 468 217 ✓	01/29/1992	Ryan, M. J., et al.	C12 N	15/76	
	EP-0 791 655 ✓	08/27/1997	Dehoff, B. S., et al.	C12 N	15/52	
	EP-0 791 656 ✓	08/27/1997	Burgett, Stanley G., et al.	C12 N	15/52	
	FR-2 696 189 ✓	04/01/1994	Blanc, V. , et al.	C12 N	15/31	
	JP-10094395 ✓	04/14/1998	Reeves, Christopher , et al.	C12 N	015/09	
	JP-61205484 ✓	09/11/1986	Aiba, Shichi	C12 N	019/54	
	JP-62029595 ✓	02/07/1987	Fujiwara, Tatsuro , et al.	C07 H	17/08	
	JP-6261765 ✓	09/20/1994		C12 N	015/54	

EXAMINER

DATE CONSIDERED

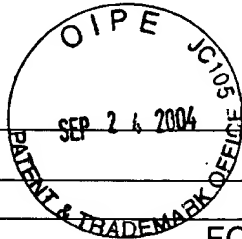
Substitute Disclosure Statement Form (PTO-1449)

* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. 1 Applicant's unique citation designation number (optional) 2 Applicant is to place a check mark here if English language Translation is attached

Substitute for form 1449A/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)



Complete if Known

Application Number 09/988,384

Filing Date November 19, 2001

First Named Inventor Sherman, David

Group Art Unit 1652

Examiner Name Kerr, Kathleen

Sheet 3 of 8

Attorney Docket No: 600.536US1

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Foreign Document No	Publication Date	Name of Patentee or Applicant of cited Document	Class	Subclass	T ²
	TA-202481 ✓	03/21/1993	Donadio, S	C12 N	015/10	
	WO-87/03907 ✓	07/02/1987	Humphreys, Gwynfor O., et al.	C12 N	15/00	
	WO-92/16629 ✓	10/01/1992	Niemi, Jarmo , et al.	C12 N	15/31	
	WO-93/13663 ✓	07/22/1993	Katz, Leonard , et al.	A01N	43/22	
	WO-95/08548 ✓	03/30/1995	Khosla, Chaitan , et al.	C07 D	311/78	
	WO-96/01901 ✓	01/25/1996	Blanc, Veronique , et al.	C12 N	15/52	
	WO-96/10084 ✓	04/04/1996	Egel-Mitani, Michi , et al.	C12 N	15/52	
	WO-96/40968 ✓	12/19/1996	Khosla, Chaitan	C12P	7/26	
	WO-97/02358 ✓	01/23/1997	Khosla, C. , et al.	C12P	19/62	
	WO-97/08323 ✓	03/06/1997	Schupp, Thomas , et al.	C12 N	15/52	
	WO-97/22711 ✓	06/26/1997	Sherman, David H., et al.	C12P	7/62	
	WO-97/23630 ✓	07/03/1997	Summers Jr., Richard G., et al.	C12 N	15/54	
	WO-98/00557 ✓	01/08/1998	Gruys, Kenneth J., et al.	C12 N	15/82	
	WO-98/01546 ✓	01/15/1998	Leadlay, Peter F., et al.	C12 N	15/00	
	WO-98/01571 ✓	01/15/1998	Leadlay, Peter F., et al.	C12 N	15/62	
	WO-98/04713 ✓	02/05/1998	Snell, Kristi D., et al.	C12 N	15/52	
	WO-98/07868 ✓	02/26/1998	Schupp, Thomas , et al.	C12 N	15/52	
	WO-98/09978 ✓	03/12/1998	Or, Yat S., et al.	C07 H	17/08	
	WO-98/11230 ✓	03/19/1998	Oki, Toshikazu , et al.	C12 N	15/52	
	WO-98/27203 ✓	06/25/1998	Barr, Philip J., et al.	C12 N	15/00	
	WO-98/36078 ✓	08/20/1998	Dennis, Douglas E., et al.	C12 N	15/52	
	WO-98/49315 ✓	11/05/1998	Khosla, Chaitan , et al.	C12 N	15/52	

EXAMINER

DATE CONSIDERED

Substitute Disclosure Statement Form (PTO-1449)

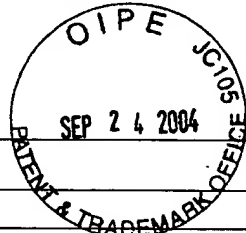
* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. 1 Applicant's unique citation designation number (optional) 2 Applicant is to place a check mark here if English language Translation is attached

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Complete if Known

Application Number 09/988,384

Filing Date November 19, 2001

First Named Inventor Sherman, David

Group Art Unit 1652

Examiner Name Kerr, Kathleen

Sheet 4 of 8

Attorney Docket No: 600.536US1

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Foreign Document No	Publication Date	Name of Patentee or Applicant of cited Document	Class	Subclass	T ²
	WO-98/51695 ✓	11/19/1998	Katz, Leonard , et al.	C07 H	17/00	
	WO-98/530097 /					
	WO-98/54308 /	12/03/1998	Leadlay, Peter F., et al.	C12 N	15/00	
	WO-99/03986 ✓	01/28/1999	Khosla, Chaitan , et al.	C12 N	15/00	
	WO-99/05283 ✓	02/04/1999	Fromentin, C. , et al.	C12 N	15/52	
	WO-99/61599 /	12/02/1999	Ashley, Gary , et al.	C12 N	15/00	

OTHER DOCUMENTS -- NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		ADLER, T. , "Plants: The New Plastics Makers", <u>Science News</u> , 146(26-27), (December 17, 1994),420	
		ANDERSEN, J. F., et al., "Characterization of Saccharopolyspora erythraea Cytochrome P-450 Genes and Enzymes, Including 6-Deoxyerythronolide B Hydroxylase", <u>Journal of Bacteriology</u> , 174(3), (February 1992),725-735	
		ANDERSON, A. J., et al., "Occurrence, Metabolism, Metabolic Role, and Industrial Uses of Bacterial Polyhydroxyalkanoates", <u>Microbiological Review</u> , 54(4), (1990),450-472	
		BETLACH, MELANIE C., et al., "Characterization of the macrolide P-450 hydroxylase from Streptomyces venezuelae which converts narbomycin to picromycin", <u>Biochemistry</u> , 37 (42), (October 1998),14937-14942	
		BEVITT, DEBRA J., et al., "6-Deoxyerythronolide-B synthase 2 from Saccharopolyspora erythraea; cloning of the structural gene, sequence analysis and inferred domain structure of the multifunctional enzyme", <u>European Journal of Biochemistry</u> , 204(1), (February 15, 1992),39-49	
		BRANDL, H. , et al., "Plastics from Bacteria and for Bacteria: Poly(beta-hydroxy-alkanoates) as Natural, Biocompatible, and Biodegradable Polyesters", <u>Advances in Biochemical Engineering Biotechnology</u> , 41, (1990),77-93	
		BYROM, D. , "Polymer synthesis by micro-organisms: technology and economics", <u>Tibtech (Trends in Biotechnology)</u> , 5, (1987),246-250	
		CANE, DAVID E., et al., "Methymycin biosynthesis. Isolation of P450 Monooxygenase activity in a cell-free system from Streptomyces venezuelae", <u>Journal of the American Chemical Society</u> , 120(11), (1998),2682-2683	
		CORTES, J. , et al., "Repositioning of a domain in a modular polyketide synthase to promote specific chain cleavage", <u>Science</u> , 268(5216), (June 9, 1995),1487-1489	

EXAMINER

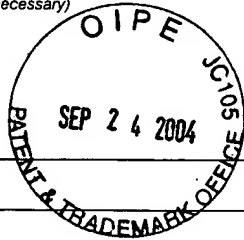
DATE CONSIDERED

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Complete if Known

Application Number 09/988,384

Filing Date November 19, 2001

First Named Inventor Sherman, David

Group Art Unit 1652

Examiner Name Kerr, Kathleen

Sheet 5 of 8

Attorney Docket No: 600.536US1

OTHER DOCUMENTS -- NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		CUNDLIFFE, E. , "Glycosylation of Macrolide Antibiotics in Extracts of Streptomyces lividans", <u>Antimicrobial Agents and Chemotherapy</u> , 36(2), (1992),348-352	
		DONADIO, S. , et al., "An erythromycin analog produced by reprogramming of polyketide synthesis", <u>Proceedings of the National Academy of Sciences USA</u> , 90(15), (August 1, 1993),7119-7123	
		DONADIO, S. , et al., "Modular Organization of Genes Required for Complex Polyketide Biosynthesis", <u>Science</u> , 252, (1991),675-679	
		DONADIO, STEFANO , et al., "Organization of the enzymatic domains in the multifunctional polyketide synthase involved in erythromycin formation in saccharopolyspora erythraea", <u>Gene</u> , 111(1), (1992),51-60	
		DOUMITH, M. , "Interspecies Complementation in Saccharopolyspora erythraea: Elucidation of the Function of oleP1, oleG1 and oleG2 from the Oleandomycin Biosynthetic Gene Cluster of Streptomyces antibioticus and Generation of New Erythromycin Derivatives", <u>Molecular Microbiology</u> , 34, (1999),1039-1048	
		FERNANDEZ-MORENO, M. A., et al., "Streptothricin Biosynthesis Is Catalyzed by Enzymes Related to Nonribosomal Peptide Bond Formation", <u>Journal of Bacteriology</u> , 179(22), (1997),6929-6936	
		FU, H. , et al., "Antibiotic activity of polyketide products derived from combinatorial biosynthesis: Implications for directed evolution", <u>Molecular Diversity</u> , 1(2), (1995),121-124	
		GAISSER, S. , et al., "Analysis of eryBI, eryBIII and eryBVII from the erythromycin biosynthetic gene cluster in Saccharopolyspora erythraea", <u>Molecular & General Genetics</u> , 258, (1998),78-88	
		GAISSER, S. , et al., "Analysis of Seven Genes from the eryAI-eryK Region of the Erythromycin Biosynthetic Gene Cluster in Saccharopolyspora erythraea", <u>Mol. Gen. Genet.</u> , 256(3), (October 1997),239-251	
		GAISSER, S. , et al., "Cloning of an Avilamycin Biosynthetic Gene Cluster from Streptomyces viridochromogenes Tu57", <u>Journal of Bacteriology</u> , 179(20), (1997),6271-6278	
		HAN, L. , et al., "Cloning and Characterization of Polyketide Synthase Genes for Jadomycin B Biosynthesis in Streptomyces venezuelae ISP5230", <u>Microbiology</u> , 140, (1994),3379-3389	
		HERNANDEZ, C. , et al., "Characterization of a Streptomyces antibioticus Gene Cluster Encoding a Glycosyltransferase Involved in Oleandomycin Inactivation", <u>Gene</u> , 134, (1993),139-140	
		HOPWOOD, D. A., "Antibiotics: Opportunities for Genetic Manipulation", <u>Philosophical Transactions of the Royal Society of London</u> , 324, (1989),549-562	
		HOPWOOD, D A., et al., "In: Genetic Manipulation of Streptomyces: A Laboratory Manual", <u>Norwich : John Innes Foundation</u> , (1985),77-78, 292-293,	

EXAMINER

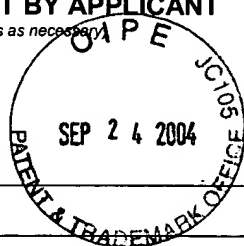
DATE CONSIDERED

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Complete if Known

Application Number	09/988,384
Filing Date	November 19, 2001
First Named Inventor	Sherman, David
Group Art Unit	1652
Examiner Name	Kerr, Kathleen

Sheet 6 of 8

Attorney Docket No: 600.536US1

OTHER DOCUMENTS -- NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		214	
		HOPWOOD, D. A., et al., "Molecular Genetics of Polyketides and its Comparison to Fatty Acid Biosynthesis", <u>Annu. Rev. Genet.</u> , 24, (1990),37-66	
		JACOBSEN, J. R., et al., "Precursor-Directed Biosynthesis of Erythromycin Analogs by an Engineered Polyketide Synthase", <u>Science</u> , 277, (1997),367-369	
		JOSHI, A. K., et al., "Construction of a cDNA encoding the multifunctional animal fatty acid synthase and expression in Spodoptera frugiperda cells using baculoviral vectors", <u>Biochem. J.</u> , 296, (1993),143-149	
		JOSHI, ANIL K., et al., "Construction, expression, and characterization of a mutated animal fatty acid synthase deficient in the dehydrase function", <u>Journal of Biological Chemistry</u> , 268(30), (1993),22508-22513	
		KAO, C. M., et al., "Engineered Biosynthesis of a Complete Macrolactone in a Heterologous Host", <u>Science</u> , 265, (1994),509-512	
		KAO, C. M., et al., "Manipulation of Macrolide Ring Size by Directed Mutagenesis of a Modular Polyketide Synthase", <u>J. Am. Chem. Soc.</u> , 117, (1995),9105-9106	
		KATZ, L. , "Manipulation of Modular Polyketide Synthases", <u>Chem. Rev.</u> , 97(7), (1997),2557-2575	
		KEALEY, J. T., et al., "Production of a Polyketide Natural Product in Nonpolyketide-Producing Prokaryotic and Eukaryotic Hosts", <u>Proceedings of the National Academy of Sciences USA</u> , 95(2), (January 20, 1998),505-509	
		KHOSLA, C. , "Harnessing the Biosynthetic Potential of Modular Polyketide Synthases", <u>Chem. Rev.</u> , 97, (1997),2577-2590	
		LIU, L. , et al., "Biosynthesis of 2-Nor-6-deoxyerythronolide B by Rationally Designed Domain Substitution", <u>J. Am. Chem. Soc.</u> , 119, (1997),10553-10554	
		LOMOVSKAYA, N. , et al., "Gene disruption and replacement in the rapamycin-producing <i>Streptomyces hygroscopicus</i> strain ATCC 29253", <u>Microbiology</u> , 143(Pt 3), (March 1997),875-883	
		MADDURI, K. , "Production of the Antitumor Drug Epirubicin (4'-epidoxorubicin) and Its Precursor by a Genetically Engineered Strain of <i>Streptomyces peucetius</i> ", <u>Nature Biotechnology</u> , 16, (Jan., 1998),69-74	
		MARAHIEL, M. A., et al., "Modular Peptide Synthetases Involved in Nonribosomal Peptide Synthesis", <u>Chemical Reviews</u> , 97, (1997),2651-2673	
		MCDANIEL, R. , et al., "Engineered Intermodular and Intramodular Polyketide Synthase Fusions", <u>Chemistry and Biology</u> , 4, (1997),667-674	
		MCDANIEL, R. , et al., "Rational Design of Aromatic Polyketide Natural Products by Recombinant Assembly of Enzymatic Subunits", <u>Nature</u> , 375, (1995),549-554	
		PEOPLES, O. P., et al., "Poly-beta-hydroxybutyrate biosynthesis in <i>Alcaligenes eutrophus</i> H16. Characterization of the genes encoding beta-ketothiolase and acetoacetyl-CoA reductase", <u>Journal of Biological Chemistry</u> , 264(26), (September 15, 1989),15293-15297	

EXAMINER

DATE CONSIDERED

Substitute Disclosure Statement Form (PTO-1449)

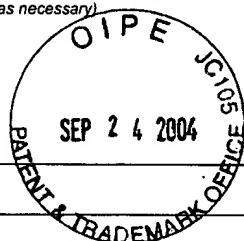
* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ¹ Applicant's unique citation designation number (optional) ² Applicant is to place a check mark here if English language Translation is attached

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Sheet 7 of 8

Complete if Known

Application Number	09/988,384
Filing Date	November 19, 2001
First Named Inventor	Sherman, David
Group Art Unit	1652
Examiner Name	Kerr, Kathleen

Attorney Docket No: 600.536US1

OTHER DOCUMENTS -- NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		POIRIER, Y. , et al., "Polyhydroxybutyrate, a Biodegradable Thermoplastic, Produced in Transgenic Plants", <u>Science</u> , 256, (1992),520-523	
		POIRIER, Y. , et al., "Production of Polyhydroxyalkanoates, a Family of Biodegradable Plastics and Elastomers, in Bacteria Plants", <u>Bio/Technology</u> , 13, (1995),142-150	
		QUIROS, L. M., et al., "Two glycosyltransferases and a glycosidase are involved in oleandomycin modification during its biosynthesis by Streptomyces antibioticus", <u>Molecular Microbiology</u> , 28, (1998),1177-1185	
		RUAN, XIAOAN , et al., "Acytransferase domain substitutions in erythromycin polyketide synthase yield novel erythromycin derivatives", <u>Journal of Bacteriology</u> , 179(20), (Oct. 1997),6416-6425	
		SALAH-BEY, K. , et al., "Targeted gene inactivation for the elucidation of deoxysugar biosynthesis in the erythromycin producer Saccharopolyspora erythraea", <u>Molecular and General Genetics</u> , 257(5), (March 1998),542-553	
		SCHNEIDER, A. , et al., "Genetic Evidence for a Role of Thioesterase Domains, Integrated in or Associated with Peptide Synthetases, in Non-Ribosomal Peptide Biosynthesis in Bacillus subtilis", <u>Arch. Microbiol.</u> , 169, (1998),404-410	
		SCHWECKE, T. , et al., "The Biosynthetic Gene Cluster for the Polyketide Immunosuppressant Rapamycin", <u>Proc. Natl. Acad. Sci. USA</u> , 92, (1995),7839-7843	
		SERVICE, R. F., "Hijacking a Cell's Chemical Paths to Make New Antibiotics", <u>Science</u> , 277, (1997),319	
		STASSI, D. , et al., "Identification of a Saccharopolyspora erythraea Gene Required for the Final Hydroxylation Step in Erythromycin Biosynthesis", <u>Journal of Bacteriology</u> , 175, (1993),182-189	
		STAUNTON, J. , et al., "Biosynthesis of Erythromycin and Rapamycin", <u>Chem. Rev.</u> , 97, (1997),2611-2629	
		SUMMERS, RICHARD G., et al., "Sequencing and mutagenesis of genes from the erythromycin biosynthetic gene cluster of Saccharopolyspora erythraea that are involved in l-mycarose and d-desosamine production", <u>Microbiology</u> , 143, (Oct. 1997),3251-3262	
		TSOI, C. J., et al., "Combinatorial Biosynthesis of 'Unnatural' Natural Products: The Polyketide Example", <u>Chemistry and Biology</u> , 2, (1995),355-362	
		VERDINE, G. L., et al., "The Combinatorial Chemistry of Nature", <u>Nature</u> , 384, (1996),11-13	
		VILCHES, C. , et al., "Role of Glycosylation and Deglycosylation in Biosynthesis of and Resistance to Oleandomycin in the Producer Organism, Streptomyces antibioticus", <u>Journal of Bacteriology</u> , 174, (1992),161-165	
		WITT, D. , et al., "Unification of the Genera Streptoverticillum and Streptomyces, and Amendment of Streptomyces Waksman and Henrici 1943, 339", <u>System. Appl. Microbiol.</u> , 13, (1990),361-371	

EXAMINER

DATE CONSIDERED

Substitute Disclosure Statement Form (PTO-1449)

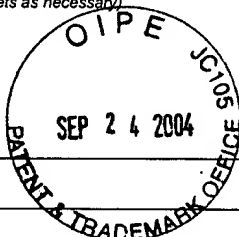
* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 809. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. 1 Applicant's unique citation designation number (optional) 2 Applicant is to place a check mark here if English language Translation is attached

Under the Paperwork Reduction Act of 1995, no persons are required to respond to a collection of information unless it contains a valid OMB control number.

Substitute for form 1449A/PTO

**INFORMATION DISCLOSURE
STATEMENT BY APPLICANT**

(Use as many sheets as necessary)



Sheet 8 of 8

Complete if Known

Application Number 09/988,384

Filing Date November 19, 2001

First Named Inventor Sherman, David

Group Art Unit 1652

Examiner Name Kerr, Kathleen

Attorney Docket No: 600.536US1

OTHER DOCUMENTS -- NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
		XUE, Y. , "A Gene Cluster for Macrolide Antibiotic Synthesis in Streptomyces venezuelae: Architecture of Metabolic Diversity", <u>Proc. Natl. Acad. Sci. USA</u> , 95, (Oct., 1998), 12111-12116	
		YAMASE, H. , "Engineering a Hybrid Sugar Biosynthesis Pathway: Production of L-Rhamnose and Its Implications on Dihydrostreptose Biosynthesis", <u>Journal of the American Chemical Society</u> , (2000), 12397-12398	
		YANG, K. , et al., "Accumulation of the angucycline antibiotic rabelomycin after disruption of an oxygenase gene in the jadomycin B biosynthetic gene cluster of Streptomyces venezuelae", <u>Microbiology</u> , 142(1), (1996), 123-132	
		YLIHONKO, K. , et al., "A gene cluster involved in nogalamycin biosynthesis from Streptomyces nogalater: Sequence analysis and complementation of early-block mutations in the anthracycline pathway", <u>Molecular & General Genetics</u> , 251(2), (1996), 113-120	
		ZHAO, LISHAN , et al., "Biosynthesis of desosamine: molecular evidence suggestion B-glucosylation as a self-resistance mechanism in Methymycin/neomethymycin producing strain, Streptomyces venezuelae", <u>Journal of the American Chemical Society</u> , 120 (36), (September 1998), 9374-9375	

EXAMINER**DATE CONSIDERED**

Substitute Disclosure Statement Form (PTO-1449)

* EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 809. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ¹ Applicant's unique citation designation number (optional) ² Applicant is to place a check mark here if English language Translation is attached